

**Abstract of the Disclosure**

A medical device is provided for improving the intensive care of high-risk newborns. The device comprises a tempered air closed circuit enclosing a neonatal capsule and comprising a dome composed of two concentric layers defining an intra-dome space therebetween, through which tempered air can circulate, to maintain the temperature in the intermediate artificial environment created between the neonatal capsule and the tempered air closed circuit. A continuous ventilation circuit is provided comprising air and oxygen inlet lines and a mixture outlet line, to administer a continuous and regulated air flow of filtered, oxygenated, tempered and humidified air to the newborn child inside the neonatal capsule. A set of doors may be provided through the neonatal capsule and dome, to provide access inside the neonatal capsule.